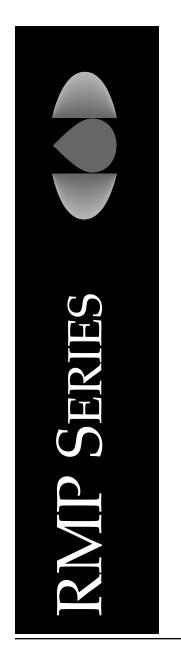


RISK MANAGEMENT PROGRAM GUIDANCE **FOR AMMONIA** REFRIGERATION (40 CFR PART 68)



This document provides guidance to help owners and operators of stationary sources to determine if their processes are subject to regulation under section 112(r) of the Clean Air Act and 40 CFR part 68 and to comply with regulations. This document does not substitute for EPA's regulations, nor is it a regulation itself. Thus, it cannot impose legally binding requirements on EPA, states, or the regulated community, and may not apply to a particular situation based upon circumstances. This guidance does not represent final agency action, and EPA may change it in the future, as appropriate.

THIS EDITION

This document is a revision of the November 1998 *Risk Management Program Guidance for Ammonia Refrigeration*. The revisions are needed to reflect several amendments to 40 CFR part 68 as well as to reflect the availability of the software for submission of RMPs. The specific changes include the following:

- g The change from SIC codes to NAICS codes to define the industrial sectors subject to Program 3; and
- g The final requirements for submission of RMPs.

Other regulatory changes are not included in this document because they are not relevant to ammonia refrigeration (e.g., the exemption of flammable fuels).

The revisions also update items, such as web page addresses, where needed. Pages that include substantive revisions to the previous text are noted by a new date in the footer. Appendices C and D in the 1998 document, which provided EPA and OSHA contacts, have been eliminated; addresses for websites that provide this information and are updated frequently are included in the Technical Assistance appendix.

FOR UPDATES

To keep up to date on changes to this document and to the risk management program rule, and to find other information related to part 68 and accident prevention, visit EPA's Chemical Emergency Preparedness and Prevention Office website at:

www.epa.gov/ceppo/

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SELECTED NAICS CODES
TECHNICAL ASSISTANCE
OSHA GUIDANCE ON PSM
HAZARD ALERT

LIST OF BOXES AND EXHIBITS IN RMP GUIDANCE

LIST OF EXHIBITS

Evaluate Facility to Identify Covered Processes Process Stationary Source
Evaluate Program Levels for Covered Processes Program Level Criteria Develop Risk Management Program and RMP Comparison of Program Requirements Program
Atmospheric Stability Classes
Steps for an Offsite Consequence Analysis Required Parameters for Modeling Ammonia Ten-Minute Building Release Attenuation Factors for Prolonged Releases Distances to Toxic Endpoint for Anhydrous Ammonia Liquefied Under Pressure Distances to Toxic Endpoint for Anhydrous Ammonia Release Rates and Distances to Toxic Endpoints for Leaks of Anhydrous Ammonia (Alternative Scenario) Guidance on Effectiveness of Building Mitigation for Worst-Case Scenarios Worst-Case Scenario — Predicted Distances to Toxic Endpoint for Anhydrous Ammonia Alternative Case Scenario — Predicted Distances to Toxic Endpoint for Anhydrous Ammonia Guidance on Effectiveness of Building Mitigation for Alternative Scenarios Simplified Presentation of Worst Case and Alternative Scenario on a Local Map monia System Wapor Pressure of Ammonia as a Function of Temperature
Sample Management Documentation
Comparable EPA and OSHA Terms Summary of Program 3 Prevention Program Process Safety Information Requirements Process Hazard Analysis Requirements Operating Procedures Requirements Mechanical Integrity Chart Management of Change Requirements Pre-startup Review Requirements Incident Investigation Requirements Employee Participation Requirements Hot Work Permits Requirements Contractors Chart

Exhibit 6a-1 Applicability of PHA Techniques
Exhibit 6a-2 Time and Staffing for PHA Techniques

CHAPTER 7

Exhibit 7-1 Federal Guidance on Emergency Planning and Response

Exhibit 7-2 Federal Emergency Planning Regulations Exhibit 7-3 Integrated Contingency Plan Outline

CHAPTER 8

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CHAPTER 10

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LIST OF BOXES

INTRODUCTION

State Programs

If You Are New to Regulations

What Is a Local Emergency Planning Committee?

CHAPTER 1

State Programs

Qs and As: Stationary Source

Qs and As: Process

Qs and As: Compliance Dates

CHAPTER 2

Q and A: Process and Program Level

Qs and As: Public Receptors
Q and A: Determining Distances
Q and A: Environmental Receptors

Qs and As: Accident History

Qs and As: OSHA

CHAPTER 3

Qs and As: Property Damage Qs and As: Accident History

CHAPTER 4

RMP*Comp

How to Obtain Census Data and LandView

How to Obtain USGS Maps

CHAPTER 6

Qs and As: Process Safety Information Qs and As: Offsite Consequences

CHAPTER 7

What Is a Response

What Is a Local Emergency Planning Committee? How Does the Emergency Response Program Apply?

CHAPTER 8

Qs and As: RMP Updates Q and A: Revising a PHA

CHAPTER 9

Qs and As: Delegation Qs and As: Audits

CHAPTER 10

What Does Your Worst-case Distance Mean?

What Does It Mean That We Could Be Exposed If We Live/Work/Shop/Go to School X Miles Away? If There Is An Accident, Will Everyone Within That Distance Be Hurt? What About Property Damage?

How Sure Are You of Your Distances?

What Are You Doing to Prevent Releases?

What Are You Doing to Prepare for Releases?

Why Are Your Distances Different from the Distances in the EPA Lookup Tables?

How Likely Are the Worst-case and Alternative Release Scenarios?

Is the Worst-case Release You Reported Really the Worst Accident You Can Have?

What about the Accident at the [Name of Similar Facility] That Happened Last Month?

What Actions Have You Taken to Involve the Community in Your Accident Prevention and Emergency Planning Efforts?

Can We See the Documentation You Keep on Site?

TABLE OF POTENTIALLY REGULATED ENTITIES

This table is not intended to be exhaustive, but rather provides a guide for readers regarding entities likely to be regulated under 40 CFR part 68 and covered by this guidance document. This table lists the types of entities that EPA is now aware could potentially be regulated by this rule (see Appendix B for a more detailed list of potentially affected NAICS codes). Other types of entities not listed in this table could also be affected. To determine whether your facility is covered by the risk management program rules in part 68, you should carefully examine the applicability criteria discussed in Chapter 1 of this guidance and in 40 CFR 68.10, which is available in Appendix A of this document. If you have questions regarding the applicability of this rule to a particular entity, call the EPCRA/CAA Hotline at (800) 424-9346 (TDD: (800) 553-7672)(see Appendix C, Technical Assistance, for other sources of information).

Category	NAICS	SIC	Examples of Potentially Regulated
	Codes	Codes	Entities
Cold storage facilities	11 01 311 20 4224 514 4228 518 4931 411		Agricultural operations Food processors Frozen and refrigerated foods distributors Beer and wines distributors Refrigerated warehouses